IN THE CLAIMS

The following is a complete listing of the claims, and replaces all earlier versions and listings.

1. (Currently Amended) A method of ~~transforming~~ <u>scrambling</u> a digital signal<u>, comprising the steps of:</u> ~~for it to be transmitted, the signal being decomposed~~

<u>decomposing the signal</u> into several regions each containing digital data<u>;</u>

[[,]]

<u>encoding</u> the signal <u>in a format</u> comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered<u>; and</u> ~~, wherein the method comprises a step of~~

modifying among the header data specific to at least one region of the signal, the part of the header data representing the amplitude of the data of the region considered.

2. (Currently Amended) A method according to claim 1, wherein

the digital data of the signal ~~being~~ <u>are</u> digital samples representing physical quantities, <u>and</u>

the part of the header data representing the amplitude of the samples of the region considered provides a number of bitplanes according to which the amplitudes of the samples are encoded based on the difference between~~, on the one hand,~~ <u>(1)</u> a number of

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so-called reference bitplanes, depending on the signal and which is deduced from information present in the signal and, on the other hand, (2) a number of zero bitplanes which is contained in [[said]] the part of the header data.

3. (Currently Amended) A method according to claim 2, wherein the modification step provides said modifying step includes providing for modifying the number of zero bitplanes.

4. (Currently Amended) A method according to claim 3, wherein the modification step provides said modifying step includes providing for increasing the number of zero bitplanes.

5. (Currently Amended) A method according to claim 1, wherein the modification said modifying step makes includes making use of at least one transformation key Ku.

6. (Currently Amended) A method according to claim 5, wherein the transformation key Ku depends on [[said]] the at least one region considered.

7. (Currently Amended) A method according to claim 5, wherein the modification said modifying step involves in particular the generation of a pseudo-random sequence based on the transformation key Ku.

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8. (Currently Amended) A method according to claim 5, ~~wherein it comprises~~ further comprising a step of transmitting the transformation key Ku.

9. (Currently Amended) A method according to claim 1, ~~wherein it comprises~~ further comprising a step of transmitting the signal so ~~transformed~~ scrambled.

10. (Currently Amended) A method of ~~transforming~~ descrambling a digital signal decomposed into a plurality of regions each containing digital data, the signal being encoded in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered, ~~wherein~~ the method ~~comprises~~ comprising the ~~following~~ steps of:

[[-]] receiving the signal of which the part of the header data representing the amplitude of the data of at least one region has undergone a modification before transmission of [[said]] the signal; and [[,]]

[[-]] modifying in reverse [[that]] the modified part of the header data in order to restore [[said]] the unmodified part of the header data of the signal.

11. (Currently Amended) A method according to claim 10, wherein

the digital data of the signal ~~being~~ are digital samples representing physical quantities, and

the part of the header data representing the amplitude of the samples of the region considered provides a modified number of bitplanes according to which the amplitudes of the samples are encoded based on the difference between, ~~on the one hand,~~

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(1) a number of ~~so-called~~ reference bitplanes, depending on the signal and which is deduced from information present in the signal and~~, on the other hand,~~ (2) a modified number of zero bitplanes which is contained in [[said]] the part of the header data.

12. (Currently Amended) A method according to claim 11, wherein ~~the~~ said step of reverse ~~modification~~ modifying provides for modifying the modified number of zero bitplanes.

13. (Currently Amended) A method according to claim 12, wherein [[the]] said step of reverse ~~modification~~ modifying provides for reducing the modified number of zero bitplanes.

14. (Currently Amended) A method according to claim 10, wherein [[the]] said step of reverse ~~modification~~ modifying makes use of at least one transformation key Ku.

15. (Currently Amended) A method according to claim 14, wherein the transformation key Ku depends on [[said]] the at least one region considered.

16. (Currently Amended) A method according to claim 14, wherein [[the]] said step of reverse ~~modification~~ modifying involves in particular the generation of a pseudo-random sequence based on the transformation key Ku.

17. (Currently Amended) A method according to claim 14, ~~wherein it comprises~~ further comprising a prior step of receiving the transformation key Ku.

18. (Currently Amended) A device for ~~transforming~~ scrambling a digital signal, ~~for it to be transmitted, the signal being decomposed~~ comprising:

means for decomposing the signal into several regions each containing digital data: [[,]]

means for encoding the signal in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered: and ~~, wherein the device comprises~~

means for modifying, among the header data specific to at least one region of the signal, the part of the header data representing the amplitude of the data of the region considered.

19. (Currently Amended) A device according to claim 18, wherein

the digital data of the signal [[being]] are digital samples representing physical quantities, and

the part of the header data representing the amplitude of the samples of the region considered provides a number of bitplanes according to which the amplitudes of the samples are encoded based on the difference between ~~, on the one hand,~~ (1) a number of ~~so-called~~ reference bitplanes, depending on the signal and which is deduced from information present in the signal and ~~, on the other hand,~~ (2) a number of zero bitplanes which is contained in [[said]] the part of the header data.

20. (Currently Amended) A device according to claim 19, wherein [[the modification]] said modifying means modify the number of zero bitplanes.

21. (Currently Amended) A device according to claim 20, wherein [[the modification]] said modifying means increase the number of zero bitplanes.

22. (Currently Amended) A device according to claim 18, wherein [[the modification]] said modifying means make use of at least one transformation key Ku.

23. (Currently Amended) A device according to claim 22, wherein the transformation key Ku depends on [[said]] the at least one region considered.

24. (Currently Amended) A device according to claim 20, wherein it comprises further comprising means for generating a pseudo-random sequence based on the transformation key Ku.

25. (Currently Amended) A device according to claim 22, wherein it comprises further comprising means for transmitting the transformation key Ku.

26. (Currently Amended) A device according to claim 18, wherein it comprises further comprising means for transmitting the signal so transformed scrambled.

27. (Currently Amended) A device for ~~transforming~~ descrambling a digital signal decomposed into a plurality of regions each containing digital data, the signal being encoded in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered, ~~wherein~~ the device ~~comprises~~ comprising:

[[-]] means for receiving the signal of which the part of the header data representing the amplitude of the data of at least one region has undergone a modification before transmission of [[said]] the signal; and [[,]]

[[-]] means for reverse ~~modification of that~~ modifying the modified part of the header data in order to restore [[said]] the unmodified part of the header data of the signal.

28. (Currently Amended) A communication apparatus, ~~wherein it~~ ~~comprises~~ comprising a device for ~~transforming~~ scrambling a digital signal according to claim 18.

29. (Currently Amended) A communication apparatus, ~~wherein it~~ ~~comprises~~ comprising a device for ~~transforming~~ descrambling a digital signal according to claim 27.

30. (Currently Amended) An information storage means which can be read by a computer or a microprocessor containing code instructions of a computer program for

executing the steps of [[the]] a method of ~~transforming~~ scrambling a digital signal, ~~according to claim 1~~ the method comprising the steps of:

decomposing the signal into several regions each containing digital data;

encoding the signal in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered; and

modifying among the header data specific to at least one region of the signal, the part of the header data representing the amplitude of the data of the regionconsidered.

31. (Currently Amended) An information storage means which can be read by a computer or a microprocessor containing code instructions of a computer program for executing the steps of [[the]] a method of ~~transforming~~ descrambling a digital signal ~~according to claim 10~~ decomposed into a plurality of regions each containing digital data, the signal being encoded in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered, the method comprising the steps of:

receiving the signal of which the part of the header data representing the amplitude of the data of at least one region has undergone a modification before transmission of the signal; and

modifying in reverse the modified part of the header data in order to restore the unmodified part of the header data of the signal.

32. (Currently Amended) A partially or totally removable information storage means which is readable by a computer or a microprocessor containing code instructions of a computer program for executing the steps of [[the]] a method of ~~transforming~~ scrambling a digital signal, the method comprising the steps of: ~~according to claim 1~~

decomposing the signal into several regions each containing digital data;

encoding the signal in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered; and

modifying among the header data specific to at least one region of the signal, the part of the header data representing the amplitude of the data of the region considered.

33. (Currently Amended) A partially or totally removable information storage means which is readable by a computer or a microprocessor containing code instructions of a computer program for executing the steps of [[the]] a method of ~~transforming~~ descrambling a digital signal ~~according to claim 10~~ decomposed into a plurality of regions each containing digital data, the signal being encoded in a format comprising header data specific to each region and which comprise at least one part representing the amplitude of the data of the region considered, the method comprising the steps of:

receiving the signal of which the part of the header data representing the amplitude of the data of at least one region has undergone a modification before transmission of the signal; and

modifying in reverse the modified part of the header data in order to restore the unmodified part of the header data of the signal.

34. (Currently Amended) A computer program stored in a computer-readable medium which can be loaded into a programmable apparatus, ~~wherein it contains~~ containing sequences of instructions or portions of software code for implementing the steps of the method of ~~transforming~~ scrambling a digital signal according to claim 1, when [[this]] the computer program is loaded and executed by the programmable apparatus.

35. (Currently Amended) A computer program stored in a computer-readable medium which can be loaded into a programmable apparatus, ~~wherein it contains~~ containing sequences of instructions or portions of software code for implementing the steps of the method of ~~transforming~~ descrambling a digital signal according to claim 10, when [[this]] the computer program is loaded and executed by the programmable apparatus.